

# WEST Search History

DATE: Friday, April 01, 2005

Hide? Set Name Query Hit Count

*DB=PGPB,USPT; PLUR=YES; OP=ADJ*

<input type="checkbox"/>	L13	L12 and l8	15
<input type="checkbox"/>	L12	19971118	33
<input type="checkbox"/>	L11	L10 and (microorganism or plant)	495
<input type="checkbox"/>	L10	L9 and udp and transferase	603
<input type="checkbox"/>	L9	Heparin	33477
<input type="checkbox"/>	L8	L7 or l6 or l5 or l4 or l3 or l2 or l1	21989
<input type="checkbox"/>	L7	(536/23.2)!.ccls.	12619
<input type="checkbox"/>	L6	(536/21)!.ccls.	396
<input type="checkbox"/>	L5	(435/252.3)!.ccls.	9090
<input type="checkbox"/>	L4	(435/193)!.ccls.	1819
<input type="checkbox"/>	L3	(435/183)!.ccls.	4844
<input type="checkbox"/>	L2	(435/101)!.ccls.	948
<input type="checkbox"/>	L1	(435/84)!.ccls.	196

END OF SEARCH HISTORY

=> s heparin/cn

L1 1 HEPARIN/CN

=> d

L1 ANSWER 1 OF 1 REGISTRY COPYRIGHT 2005 ACS on STN

RN 9005-49-6 REGISTRY

ED Entered STN: 16 Nov 1984

CN Heparin (8CI, 9CI) (CA INDEX NAME)

OTHER NAMES:

CN  $\alpha$ -Heparin

CN Ardeparin

CN Arteven

CN Bemiparin

CN Certoparin

CN Clevarin

CN Clivarin

CN Clivarine

CN CY 216

CN CY 222

CN Dalteparin

CN Fluxum

CN FR 860

CN Fragmin A

CN Fragmin B

CN Fraxiparin

CN H 5284

CN H 9399

CN Hapacarin

CN Heparin subcutan

CN Heparin sulfate

CN Heparinic acid

CN KB 101

CN Leparan

CN Liveracine

CN Mono-embolex

CN Multiparin

CN Nadroparin

CN Novoheparin

CN OP 386

CN OP 622

CN Pabyrn

CN Parnaparin

CN Parvoparin

CN Reviparin

CN Sandoparin

CN Sublingula

CN Tinzaparin

CN Triofiban

CN Vetren

CN Vitrum AB

DR 9075-96-1, 11078-24-3, 11129-39-8, 104521-37-1, 37324-73-5, 91449-79-5

MF Unspecified

CI PMS, COM, MAN

PCT Manual registration, Polyester, Polyester formed

LC STN Files: ADISNEWS, AGRICOLA, ANABSTR, BIOBUSINESS, BIOSIS, BIOTECHNO,

CA, CABA, CANCERLIT, CAPLUS, CASREACT, CBNB, CEN, CHEMCATS, CHEMLIST,

CIN, CSCHEM, DDFU, DIOGENES, DRUGU, EMBASE, HSDB\*, IFICDB, IFIPAT,

IFIUDB, IMSCOSEARCH, IMSDRUGNEWS, IMSPATENTS, IMSRESEARCH, IPA, MEDLINE,

MRCK\*, MSDS-OHS, NAPRALERT, NIOSHTIC, PHAR, PIRA, PROMT, PS, RTECS\*,

TOXCENTER, USAN, USPAT2, USPATFULL

(\*File contains numerically searchable property data)

Other Sources: DSL\*\*, EINECS\*\*, WHO

L2 ANSWER 29 OF 29 REGISTRY COPYRIGHT 2005 ACS on STN

RN 2616-64-0 REGISTRY

ED Entered STN: 16 Nov 1984

CN  $\alpha$ -D-Glucopyranuronic acid, 1 $\rightarrow$ P'-ester with uridine 5'- (trihydrogen diphosphate) (9CI) (CA INDEX NAME)

OTHER CA INDEX NAMES:

CN  $\alpha$ -D-Glucopyranuronic acid, ester with uridine 5'-pyrophosphate (6CI)

CN Glucopyranuronic acid, 1-ester with uridine 5'-pyrophosphate (7CI)

CN Glucopyranuronic acid, 1 $\rightarrow$ 5'-ester with uridine 5'- (trihydrogen pyrophosphate),  $\alpha$ -D- (8CI)

OTHER NAMES:

CN UDP-D-glucuronic acid

CN **UDP-glucuronic acid**

CN Uridine 5'-diphospho- $\alpha$ -D-glucuronic acid

CN Uridine 5'-diphosphoglucuronic acid

CN Uridine diphosphate glucuronic acid

CN Uridine diphospho-D-glucuronic acid

CN Uridine diphosphoglucuronic acid

CN Uridine pyrophosphoglucuronic acid

FS STEREOSEARCH

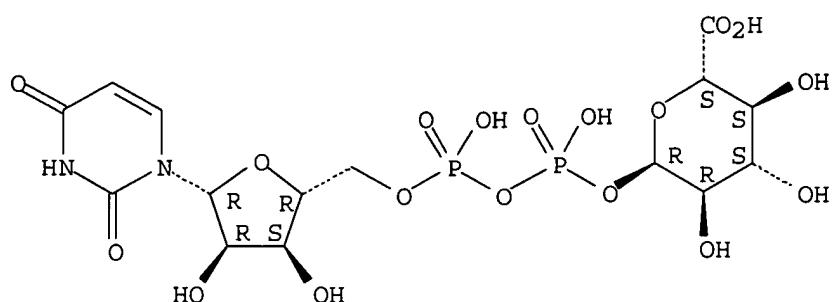
DR 14520-48-0, 3545-73-1, 5918-40-1, 27939-24-8, 30329-32-9

MF C15 H22 N2 O18 P2

LC STN Files: AGRICOLA, ANABSTR, BEILSTEIN\*, BIOBUSINESS, BIOSIS,  
BIOTECHNO, CA, CANCERLIT, CAOLD, CAPLUS, CASREACT, CHEMCATS, CSCHEM,  
EMBASE, IFICDB, IFIPAT, IFIUDB, MEDLINE, NIOSHTIC, TOXCENTER, USPAT2,  
USPATFULL

(\*File contains numerically searchable property data)

Absolute stereochemistry.



\*\*PROPERTY DATA AVAILABLE IN THE 'PROP' FORMAT\*\*

734 REFERENCES IN FILE CA (1907 TO DATE)

11 REFERENCES TO NON-SPECIFIC DERIVATIVES IN FILE CA

735 REFERENCES IN FILE CAPLUS (1907 TO DATE)

45 REFERENCES IN FILE CAOLD (PRIOR TO 1967)

=> d full his

(FILE 'HOME' ENTERED AT 15:48:51 ON 01 APR 2005)

FILE 'REGISTRY' ENTERED AT 15:49:24 ON 01 APR 2005  
L1 1 SEA ABB=ON PLU=ON HEPARIN/CN

FILE 'HCAPLUS' ENTERED AT 15:49:31 ON 01 APR 2005

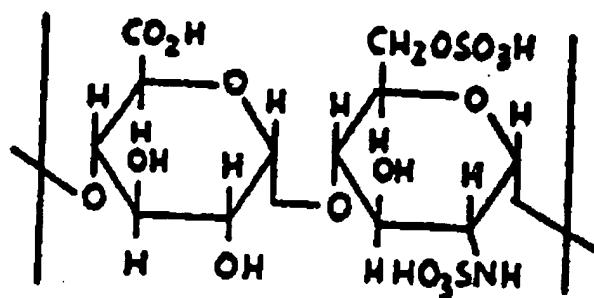
FILE 'REGISTRY' ENTERED AT 15:49:34 ON 01 APR 2005  
L2 SET SMARTSELECT ON  
SEL PLU=ON L1 1- CHEM : 49 TERMS  
SET SMARTSELECT OFF

FILE 'HCAPLUS' ENTERED AT 15:49:34 ON 01 APR 2005

L3 45481 SEA ABB=ON PLU=ON L2  
L4 133 SEA ABB=ON PLU=ON L3 (L) TRANSFERASE  
L5 22 SEA ABB=ON PLU=ON L4 (L) UDP  
L6 10 SEA ABB=ON PLU=ON L5 AND PD<19971118

**21 Heparin or derivative**

This subclass is indented under subclass 18.7. Compounds which are polysaccharides containing the following repeating unit wherein the degree of sulfation of the individual components in the polysaccharide is apparently not uniform and may vary at different areas of the carbohydrate chain, and derivatives thereof.



(1) Note. Heparin is a natural substance which can be found in various tissues of mammals, especially the lung, spleen, liver and muscle, and has been used medicinally for coagulation of blood and metabolism of lipids.



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 1: Haemostasis. 1990;20 Suppl 1:146-53.

Related Articles, Links

## Approaches to the synthesis of heparin.

**Lindahl U.**

Department of Veterinary Medical Chemistry, Swedish University of Agricultural Sciences, Uppsala.

The biosynthesis of heparin is initiated by formation of [GlcA-GlcNAc]<sub>n</sub> polysaccharide chains linked to the core protein of a proteoglycan structure. The polymer is transformed into the mature polysaccharide by a series of modification reactions which involve N-deacetylation and N-sulfation of GlcNAc units, C5 epimerization of GlcA to IdoA residues, and O-sulfation at different positions. Incomplete modification, controlled in part by the substrate specificities of the corresponding enzymes, provides the complex saccharide sequences that are typical for heparin and, in particular, for heparan sulfate. One such structure is the antithrombin-binding region which is comprised by a specific pentasaccharide sequence with a 3-O-sulfated GlcN marker group. Aspects of regulation of polymer modification are discussed.

### Publication Types:

- Review
- Review, Tutorial

PMID: 2083867 [PubMed - indexed for MEDLINE]

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Mar 29 2005 17:30:14